



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/723,254	11/26/2003	David J. Yonce	279.628US1	6063
21186 7590 02/16/2007 SCHWEGMAN, LUNDBERG, WOESSNER & KLUTH, P.A. P.O. BOX 2938 MINNEAPOLIS, MN 55402			EXAMINER OROPEZA, FRANCES P	
			ART UNIT 3766	PAPER NUMBER
SHORTENED STATUTORY PERIOD OF RESPONSE		MAIL DATE	DELIVERY MODE	
3 MONTHS		02/16/2007	PAPER	

**Please find below and/or attached an Office communication concerning this application or proceeding.**

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

<b>Office Action Summary</b>	<b>Application No.</b> 10/723,254	<b>Applicant(s)</b> YONCE ET AL.	
	<b>Examiner</b> Frances P. Oropeza	<b>Art Unit</b> 3766	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 2/6/07 (RCE) & 12/6/06 (Amendment).
- 2a) ☐ This action is FINAL.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-17 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-17 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)                                | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                       | 5) <input type="checkbox"/> Notice of Informal Patent Application                       |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

## **DETAILED ACTION**

### ***Request for Continued Examination***

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. The Applicant's submission filed on 2/6/07 has been entered.

2. The Applicant amended independent claim 1 in the response filed 12/6/06 hence the rejection of record is withdrawn and a new rejection established in the subsequent paragraphs.

### ***Claim Rejections - 35 USC § 103***

3. Claims 1-7 and 9-16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Levine et al. (US 6748274) in view of Samuelsson et al. (US 7050857).

Levine et al. disclose a method and apparatus for displaying information comprising an implantable device (100) the implantable device comprising a first sensing channel (82 or 84) and a controller (60). The method and apparatus further comprise an external programmer (102) including a display (video display (214) and printer (236)) to show graphical data (waveform and histogram). The electrocardiogram data is compiled with respect to time and with respect to heart rate. Events are time stamped/ marked (figures 2, 3, 5, 8-11B; col. 5 @ 33-45; col. 7 @ 7-16; col. 9 @ 1-12; col. 10 @ 60-62; col. 12 @ 53-54; col. 13 @ 59-61; col. 14 @ 16-18, 31-34; col. 15 @ 5-12; col. 16 @ 17-19).

Art Unit: 3766

As to claims 2 and 13, the representative electrocardiogram (IECG) is an average of a plurality of IECGs and is a function of time/ heart rate (col. 14 @ 31-34; col. 15 @ 5-13; col. 15 @ 67 – col. 16 @ 3).

As to claims 3 and 12, the representative electrocardiogram (IECG) is a single IECG and is a function of time/ heart rate (col. 12 @ 42-47; col. 14 @ 31-34; col. 15 @ 5-13).

As to claims 4 and 14, the representative electrocardiogram (IECG) is an intrinsic IECG and are a function of time/ heart rate (col. 13 @ 55-57; col. 14 @ 31-34; col. 15 @ 5-13).

As to claims 5 and 15, the representative electrocardiograms are evoked responses from the evoked response window, collected as paces, and are functions of time/ heart rate (col. 4 @ 3-6; col. 7 @ 42; col. 15 @ 5-13; col. 15 @ - col. 16 @ 3).

As to claims 6 and 9, the representative electrocardiograms may be continuous relative to time and period, and are derived as a function of time/ heart rate (col. 15 @ 5-13; col. 15 @ 67 – col. 16 @ 3).

As to claims 7 and 16, the display screen (9214) or the printer (236) display the representative electrocardiogram (fig. 5).

As to claim 10, the controller maintains representative electrocardiograms being discarded (col. 14 @ 63-67).

As discussed in the eight previous paragraphs of this action, Levine et al. disclose the claimed invention except for the representative electrograms being overlain upon one another.

Samuelsson et al. teach programmer display using representative electrograms being overlain upon one another for the purpose of enabling comparison of different waveforms. It

Art Unit: 3766

would have been obvious to one having ordinary skill in the art at the time of the invention to have electrograms being overlain upon one another in the Levine et al. system in order to enable data comparison so the pacemaker data can be used to diagnose the condition of the patient, and based on the diagnosis, the pacemaker adapted to treat the condition of the patient (abstract; col. 1 @ 21-27; col. 7 @ 46-55).

4. Claims 8 and 17 stand rejected under 35 U.S.C. 103(a) as being unpatentable over Levine et al. (US 6748274) and Samuelsson et al. (US 7050857) in view of Palmer et al. (US 5830150). As discussed in paragraph 3 of this action, modified Levine et al. disclose the claimed invention except for the graphic display having the magnitude of the electrocardiogram displayed in shading or color.

Palmer et al. teach data display using a graphic display having the magnitude of the electrocardiogram displayed in shading or color for the purpose of highlighting changes in the condition of the patient. It would have been obvious to one having ordinary skill in the art at the time of the invention to have the magnitude of the electrocardiogram displayed in shading or color in the modified Levine et al. system in order for the caregivers to become more easily aware of striking events and more subtle events, the caregiver's eyes being drawn by the colors to the variable at the time of its change so appropriate care can be provided for the patient's changing condition (col. 1 @ 53-55; col. 3 @ 6-18; col. 4 @ 1-26; col. 5 @ 1-23).

*Statutory Basis*

5. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

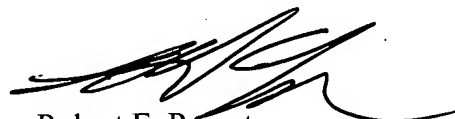
*Conclusion*

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Fran Oropeza whose telephone number is (571) 272-4953. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Robert E. Pezzuto can be reached on (571) 272-6996. The fax phone numbers for the organization where this application or proceeding is assigned is (571) 273-8300 for regular communication and for After Final communications.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Frances P. Oropeza  
Patent Examiner  
Art Unit 3766

*ffo*  
*2-13-07*

  
Robert E. Pezzuto  
Supervisory Patent Examiner  
Art Unit 3766